DOCUMENT RESUME

ED 421 367 SE 061 691

AUTHOR	Johnson, Eugene G.; Siegendorf, Adriane
TITLE	Linking the National Assessment of Educational Progress (NAEP) and the Third International Mathematics and Science Study (TIMSS): Eighth-Grade Results. Research and Development Report.
INSTITUTION	Educational Testing Service, Princeton, NJ.; Westat, Inc., Rockville, MD.
SPONS AGENCY	National Center for Education Statistics (ED), Washington, DC.
REPORT NO	NCES-98-500
PUB DATE	1998-07-00
NOTE	108p.
PUB TYPE	Reports - Research (143)
EDRS PRICE	MF01/PC05 Plus Postage.
DESCRIPTORS	*Academic Achievement; Educational Assessment; *Grade 8; Junior High Schools; *Mathematics Education; *National Competency Tests; *Science Education
IDENTIFIERS	National Assessment of Educational Progress; *Third International Mathematics and Science Study

ABSTRACT

Because education in the United States is largely determined at the state and local levels, there has been considerable interest in how the performance of students in individual states compares with each other, with the United States as a whole, and with other nations. The comparison of state performance with other states and with the nation as a whole is made possible by the National Assessment of Educational Progress (NAEP). In 1996, NAEP assessed mathematics and science in the United Sates as a whole. The Third International Mathematics and Science Study (TIMSS) conducted in 1995 provides the most recent information about America's progress in mathematics and science education compared with other countries in the world. This study is one of two reports about the linking of NAEP results to TIMSS results for Grade 8 mathematics and science. The study describes the types of linking approaches considered, the methods used to develop the linking functions, the sources of variability that affect the variance of the linking functions, and the validation and results obtained for Grade 8 mathematics and science achievement. (ASK)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

ED 421 367

NATIONAL CENTER FOR EDUCATION STATISTICS

Research and Development Report July 1998

Linking the National Assessment of Educational Progress (NAEP) and the Third International Mathematics and Science Study (TIMSS): Eighth-Grade Results

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)
This document has been reproduced as received from the person or organization originating it.
☐ Minor changes have been made to improve reproduction quality.
• Points of view or opinions stated in this document do not necessarily represent official OERI position or policy.

U.S. Department of Education
Office of Educational Research and Improvement NCES 98-500

NATIONAL CENTER FOR EDUCATION STATISTICS

Research and Development Report July 1998

Linking the National Assessment of Educational Progress (NAEP) and the Third International Mathematics and Science Study (TIMSS): Eighth-Grade Results

Eugene G. Johnson, Educational Testing Service
Adriane Siegendorf, Education Statistics Services Institute

Gary W. Phillips, Project Officer
National Center for Education Statistics

U.S. Department of Education
Office of Educational Research and Improvement NCES 98-500

U.S. Department of Education
Richard W. Riley
Secretary

Office of Educational Research and Improvement
C. Kent McGuire
Assistant Secretary

National Center for Education Statistics
Pascal D. Forgione, Jr.
Commissioner

The National Center for Education Statistics (NCES) is the primary federal entity for collecting, analyzing, and reporting data related to education in the United States and other nations. It fulfills a congressional mandate to collect, collate, analyze, and report full and complete statistics on the condition of education in the United States; conduct and publish reports and specialized analyses of the meaning and significance of such statistics; assist state and local education agencies in improving their statistical systems; and review and report on education activities in foreign countries.

NCES activities are designed to address high priority education data needs; provide consistent, reliable, complete, and accurate indicators of education status and trends; and report timely, useful, and high quality data to the U.S. Department of Education, the Congress, the states, other education policymakers, practitioners, data users, and the general public.

We strive to make our products available in a variety of formats and in language that is appropriate to a variety of audiences. You, as our customer, are the best judge of our success in communicating information effectively. If you have any comments or suggestions about this or any other NCES product or report, we would like to hear from you. Please direct your comments to:

National Center for Education Statistics
Office of Educational Research and Improvement
U.S. Department of Education
555 New Jersey Avenue NW
Washington, DC 20208–5574

July 1998

The NCES World Wide Web Home Page address is
http://nces.ed.gov

Suggested Citation
U.S. Department of Education. National Center for Education Statistics. *Linking the National Assessment of Educational Progress (NAEP) and the Third International Mathematics and Science Study (TIMSS): Eighth-Grade Results,* NCES 98-500, by Eugene G. Johnson and Adriane Siegendorf. Project Officer, Gary W. Phillips. Washington, DC: 1998.

Contact:
Arnold Goldstein
(202) 219–1741

Foreword

The Research and Development (R&D) series of the reports has been initiated:

1. To share studies and research that are developmental in nature. The results of such studies may be revised as the work continues and additional data become available.

2. To share results of studies that are, to some extent, on the "cutting-edge" of methodological developments. Emerging analytical approaches and new computer software development often permits new, and sometimes controversial, analysis to be done. By participating in "frontier research," we hope to contribute to the resolution of issues and improved analysis.

3. To participate in discussions of emerging issues of interest to educational researchers, statisticians, and the Federal statistical community in general. Such reports may document workshops and symposiums sponsored by NCES that address methodological and analytical issues or may share and discuss issues regarding NCES practice, procedures, and standards.

The common theme in all three goals is that these reports present results or discussions that do not reach definitive conclusions at this point in time, either because the data are tentative, the methodology is new and developing, or the topic is one on which there are divergent views. Therefore the techniques and inferences made from the data are tentative and are subject to revision. To facilitate the process of closure on the issues, we invite comment, criticism, and alternatives to what we have done. Such responses should be directed to:

Marilyn M. McMillen
Chief Statistician
Statistical Standards Services Group
National Center for Education Statistics
555 New Jersey Avenue NW
Washington, DC 20208-5654

Acknowledgments

The authors wish to thank all those who contributed to the production of this report. This report was produced with the assistance of professional staff at the Education Statistics Service Institute (ESSI), the National Center for Education Statistics (NCES), the National Institute of Statistical Sciences (NISS), and Westat, Inc.

The ESSI staff who provided text and reviews for this report include: Ramsay Selden, Karol Krotki, and Michell Long.

Many thanks are due to Arnold Goldstein, who coordinated production of this report, and to the numerous reviewers at NCES. The comments and critical feedback of the following reviewers are reflected in this report: Gary W. Phillips, Marty Orland, Marilyn M. McMillen, Eugene Owen, Maureen Treacy, and Mary Frase. Thanks also to the external reviewers at NISS: Ingram Olkin, Lyle V. Jones, Richard M. Jaeger, Juliet Shaffer, Valerie Williams, James R. Chromy, Jerome Sacks, and Susan Ahmed.

We would also like to acknowledge the contribution of Nancy Caldwell at Westat to the design of the profiles.

Table of Contents

Chapter		Page
1	INTRODUCTION	1
2	NAEP AND TIMSS	3
3	REPORT OUTLINE	4
4	COMPARISONS OF EACH NAEP STATE AND JURISDICTION WITH THE TIMSS NATIONS FOR GRADE 8 MATHEMATICS	6
5	COMPARISONS OF EACH NAEP STATE AND JURISDICTION WITH THE TIMSS NATIONS FOR GRADE 8 SCIENCE	53
	REFERENCES	100

1. INTRODUCTION

In 1989, the Nation's President along with its governors made clear that there was a keen interest in comparing the educational performance of United States' students with that of students in other countries. That year a National Education Summit adopted six education goals, one of which stated that by the year 2000, "U.S. students will be first in the world in science and mathematics achievement" (National Education Goals Panel, 1991, p. 16).

The Third International Mathematics and Science Study (TIMSS), conducted in 1995, provides the most recent information about our country's progress toward this goal. TIMSS is the largest, most comprehensive, and most rigorous international study of the schools and student achievement ever conducted. The international project involved the testing of more than a half-million students in mathematics and science at several different grade levels in 41 countries. The TIMSS results for the United States describe student mathematics and science achievement for both the country as a whole and for various subgroups of the population. These U.S. results are directly comparable to TIMSS results from many other countries. However, with the exception of a few states that chose to participate in the state-level TIMSS program, equivalent TIMSS results are not available at the state level.

Because education in the United States is largely determined at the state and local levels, there has been considerable interest in how the performance of students in individual states compares with each other, with the United States as a whole, and with other nations. The comparison of state performance with other states and with the nation as a whole is made possible by the National Assessment of Educational Progress (NAEP). NAEP surveys the educational accomplishment of U.S. students and monitors changes in those accomplishments. NAEP tracks the educational achievements of fourth-, eighth-, eleventh-, and twelfth-grade students over time in selected content areas. For nearly 30 years, NAEP has been collecting data to provide educators and policymakers with accurate and useful information.

In 1996, NAEP assessed mathematics and science in the United States as a whole. Additionally, results for the individual states that chose to participate in the state NAEP assessment are available at grades 4 and 8 for mathematics and at grade 8 for science. While it is directly possible to compare the participating states with each other and with the nation as a whole, policymakers and the general public cannot know directly how the students in the various states would perform relative to students in other countries.

Because TIMSS and NAEP were administered within a year of each other, there has been considerable interest in attempting to link the two assessments. Such a linkage would allow states that participated in the state component of the NAEP mathematics or science assessments to compare their predicted TIMSS results with the actual results from countries participating in TIMSS at the same grade level. Specifically, predicted performance on TIMSS could be estimated for each state that participated in NAEP by applying the link to that state's NAEP data.

The success of the link between the 1992 NAEP mathematics results with those from the 1991 International Assessment of Educational Progress (IAEP) in mathematics (Pashley and Phillips 1993) provided encouragement that a link between TIMSS and NAEP was possible.

2. NAEP AND TIMSS

NAEP is an ongoing, congressionally mandated survey designed to measure what students know and can do. The goal of NAEP is to estimate educational achievement and changes in that achievement over time for American students of specified grades as well as for subpopulations defined by demographic characteristics and by specific background characteristics and experiences. In 1996, NAEP collected mathematics and science data from nationally representative samples of students in public and private schools in grades 4, 8, and 12. Additionally, directly comparable state assessments were conducted in public and private schools in participating states and jurisdictions at grade 4 for mathematics and at grade 8 for mathematics and science. (For many of the states and jurisdictions the sample of private school students was not adequate to support reporting of private school results. Accordingly, state-level results were reported by NAEP for the public school samples only.) State-level NAEP mathematics and science results are available for grade 8 public school students in 44 states and jurisdictions.

TIMSS is the largest and most ambitious study ever conducted by the International Association for the Evaluation of Educational Achievement (IEA). TIMSS is an international comparative study designed to provide information about educational achievement and learning contexts for the participating countries. Each participating country assessed mathematics and science in the two grades with the largest proportion of 13-year-olds (grades 7 and 8 in most countries, including the United States). Mathematics and science results are available for 41 countries for the higher of these grade levels--which, for convenience, will be referred to as the grade 8 level in this report. The U.S. TIMSS results are based on the sample of students from public and private schools.

In addition to the national results, three states opted to collect grade 8 data from representative samples of their students. Minnesota participated in a state-level administration of grade 8 TIMSS mathematics and science in 1995, while Missouri and Oregon participated in state-level administrations of grade 8 TIMSS in 1997. All three states also participated in the 1996 State NAEP. Thus, released public school NAEP results are available for all three states, as well as released TIMSS results for Minnesota. The TIMSS results for Missouri and Oregon have not yet been publicly released; however, preliminary data allowed some empirical verification of the linkage between NAEP and TIMSS.

3. REPORT OUTLINE

This is one of two reports about the linking of NAEP results to TIMSS results for grade 8 mathematics and science. The first, "Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report," is a technical discussion of the statistical methods employed to link NAEP and TIMSS. It describes the types of linking approaches considered, the method used to develop the linking functions, the sources of variability that affect the variance of the linking functions, and the validation and results obtained for grade 8 mathematics and science. Readers interested in the statistical aspects of this research are referred to the technical report.

The results presented in this report are based on a link of NAEP to TIMSS, thereby providing predicted TIMSS results for given NAEP results. Since a major goal of the link is to enable comparisons between states and countries, links were estimated for those grades and subjects where there are both state NAEP data and international TIMSS data. The links are based on the data from the U.S. TIMSS national sample and from the NAEP national sample. Furthermore, the links are derived from public school data, since this is the population for which NAEP state-level results have been published. The actual TIMSS results of the participating nations include both private and public school data. The results in this report are for mathematics and science at grade 8. An additional link is being attempted for grade 4 mathematics but is still undergoing NCES review.

The quality of the link between NAEP and TIMSS was evaluated using data from the few states for which representative data were available from both assessments. Specifically, the predicted TIMSS performance, based on NAEP data, was compared with the actual TIMSS results for these states. In the 1995 administration of TIMSS, one state, Minnesota, elected to participate in the grade 8 TIMSS assessments of mathematics and science. The predicted results were quite close to the actual results for the grade 8 mathematics and science assessments. In addition, two states, Missouri and Oregon, participated in a special assessment of the TIMSS in their states in 1997. While the results of these assessments have not yet been publicly released, the predicted TIMSS results for these states were reasonably close to their actual TIMSS results.

This report, "Linking the National Assessment of Educational Progress and the Third International Mathematics and Science: Eighth Grade Results," presents the results of the linking project. Comparisons are given for grade 8 mathematics and science of the states and jurisdictions which participated in NAEP in 1996 with the nations that participated in TIMSS in

1995. In addition, for each state and jurisdiction, the estimated percentage of students reaching the TIMSS International Top Half and Top Ten Percent marker levels are given for grade 8 mathematics and science.

The reader should use caution when using the results presented in this report. The results presented here are adequate for approximate comparisons of the relative rankings of individual states versus other countries, but are not adequate for extensive analyses based on the estimated scores. The results presented in this report are not appropriate for comparing performance between states or between countries.

4. COMPARISONS OF EACH NAEP STATE AND JURISDICTION WITH THE TIMSS NATIONS FOR GRADE 8 MATHEMATICS

This chapter presents one-page profiles for each state and jurisdiction participating in NAEP in grade 8 mathematics in alphabetical order. Each profile contains two tables.

- The first table displays how the state or jurisdiction would perform in comparison to the 41 nations that took TIMSS mathematics at grade 8. Each table indicates whether the **actual** scores of the participating TIMSS nations are significantly higher than, not significantly different from, or significantly lower than the **estimated** average performance of public school students in the state or jurisdiction.

- The second table displays a range of possible values for the estimated percentage of public school students in the state or jurisdiction that would perform above the TIMSS Top Ten Percent marker level and the TIMSS Top Half marker level for mathematics at grade 8. The TIMSS Top Ten Percent marker level represents the score achieved by the top ten percent of all eighth grade students in the 41 TIMSS countries combined. The TIMSS Top Half marker level represents the score achieved by the top fifty percent of all eighth grade students in the 41 TIMSS countries combined. Each table presents the estimated percentage of public school students in the state that are expected to perform above the TIMSS marker levels. The lower and upper bounds represent the range of possible values around these estimated percentages (95% confidence intervals).

A second profile is presented for the state of Minnesota. Similar tables to those described above are included. However, in this profile, the **actual** TIMSS results for Minnesota's public school students are compared with the results of the 41 nations who participated in TIMSS for grade 8 mathematics.

Readers of these profiles are reminded that the state's or jurisdiction's TIMSS performance in grade 8 mathematics is **estimated** from its NAEP score, using the linking function, and must therefore be interpreted with caution. Furthermore, the calculations for the 1996 NAEP scores and 1995 TIMSS scores for the participating states, jurisdictions, and nations are based on samples of the student populations, not entire student populations. Hence, estimates are imprecise.

The SOLE purpose of these profiles is to allow the comparison of the predicted TIMSS performance for individual states with the actual TIMSS performance of individual countries. It is NOT appropriate to use these profiles to compare performance between states or between countries. Accordingly, the profiles for the states and jurisdictions participating in NAEP grade 8 mathematics are arranged in alphabetical order. The proper between state comparisons are provided in the NAEP reports (O'Sullivan, Reese and Mazzeo 1997; Reese et al. 1997), while the proper between country comparisons are provided in the TIMSS reports (Beaton, Mullis, et al. 1997; Beaton, Martin, et al. 1997).

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Alabama

If the public school students in Alabama participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Alabama	Not significantly different from Alabama	Lower than Alabama
(Australia)	Cyprus	(Colombia)
(Austria)	(Greece)	Iran, Islamic Republic
Belgium – Flemish	Iceland	(Kuwait)
(Belgium – French)	(Lithuania)	(South Africa)
(Bulgaria)	Portugal	
Canada	(Romania)	
Czech Republic	Spain	
(Denmark)		
(England)		
France		
(Germany)		
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia-LSS)		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Alabama that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	1%	3%
Top 50% (Half)	23%	32%	42%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Alaska)

If the public school students in Alaska participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Alaska	Not significantly different from Alaska	Lower than Alaska
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Greece)
Japan	(Bulgaria)	Iran, Islamic Republic
Korea	Canada	(Kuwait)
Singapore	(Denmark)	(Lithuania)
Slovak Republic	(England)	Portugal
(Switzerland)	France	(Romania)
	(Germany)	(South Africa)
	Hungary	Spain
	Iceland	
	Ireland	
	(Israel)	
	(Latvia – LSS)	
	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	(Slovenia)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Alaska that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	3%	7%	11%
Top 50% (Half)	46%	55%	64%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Arizona

If the public school students in Arizona participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Arizona	Not significantly different from Arizona	Lower than Arizona
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia-LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	United States (average)	
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Arizona that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	2%	4%
Top 50% (Half)	34%	43%	52%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Arkansas)

If the public school students in Arkansas participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Arkansas	Not significantly different from Arkansas	Lower than Arkansas
(Australia)	Cyprus	(Colombia)
(Austria)	(Greece)	Iran, Islamic Republic
Belgium – Flemish	Iceland	(Kuwait)
(Belgium – French)	(Latvia-LSS)	(South Africa)
(Bulgaria)	(Lithuania)	
Canada	Portugal	
Czech Republic	(Romania)	
(Denmark)	(Scotland)	
(England)	Spain	
France	United States (average)	
(Germany)		
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Arkansas that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	2%	3%
Top 50% (Half)	28%	37%	46%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: California

If the public school students in California participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than California	Not significantly different from California	Lower than California
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(Greece)	(Kuwait)
(Belgium – French)	Iceland	(South Africa)
(Bulgaria)	(Latvia-LSS)	
Canada	(Lithuania)	
Czech Republic	Norway	
(England)	Portugal	
France	(Romania)	
(Germany)	(Scotland)	
Hong Kong	Spain	
Hungary	United States (average)	
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in California that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	30%	38%	46%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Colorado

If the public school students in Colorado participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Colorado	Not significantly different from Colorado	Lower than Colorado
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
(Bulgaria)	Canada	(Greece)
Czech Republic	(Denmark)	Iran, Islamic Republic
France	(England)	(Kuwait)
Hong Kong	(Germany)	(Lithuania)
Hungary	Iceland	Portugal
Japan	Ireland	(Romania)
Korea	(Israel)	(South Africa)
(Netherlands)	(Latvia – LSS)	Spain
Singapore	New Zealand	
Slovak Republic	Norway	
(Slovenia)	Russian Federation	
(Switzerland)	(Scotland)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Colorado that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	4%	6%
Top 50% (Half)	44%	52%	60%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Connecticut

If the public school students in Connecticut participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Connecticut	Not significantly different from Connecticut	Lower than Connecticut
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Greece)
Japan	(Bulgaria)	Iceland
Korea	Canada	Iran, Islamic Republic
Singapore	(Denmark)	(Kuwait)
Slovak Republic	(England)	(Latvia – LSS)
(Switzerland)	France	(Lithuania)
	(Germany)	Portugal
	Hungary	(Romania)
	Ireland	(South Africa)
	(Israel)	Spain
	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	(Slovenia)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Connecticut that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	9%
Top 50% (Half)	49%	56%	64%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Delaware

If the public school students in Delaware participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Delaware	Not significantly different from Delaware	Lower than Delaware
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Latvia-LSS)	
France	(Lithuania)	
Hong Kong	New Zealand	
Hungary	Norway	
Ireland	(Romania)	
(Israel)	(Scotland)	
Japan	Spain	
Korea	United States (average)	
(Netherlands)		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Delaware that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	33%	41%	49%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Department of Defense Domestic Dependent Elementary and Secondary Schools – DDESS

If the public school students in DDESS participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than DDESS	Not significantly different from DDESS	Lower than DDESS
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia-LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	Sweden	
Singapore	(Thailand)	
Slovak Republic	United States (average)	
(Slovenia)		
(Switzerland)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in DDESS that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	8%
Top 50% (Half)	33%	43%	54%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Department of Defense Dependent Schools – DoDDS

If the public school students in the DoDDS participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than DoDDS	Not significantly different from DoDDS	Lower than DoDDS
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
(Bulgaria)	Canada	(Greece)
Czech Republic	(Denmark)	Iran, Islamic Republic
France	(England)	(Kuwait)
Hong Kong	(Germany)	(Lithuania)
Hungary	Iceland	Portugal
Japan	Ireland	(Romania)
Korea	(Israel)	(South Africa)
(Netherlands)	(Latvia – LSS)	Spain
Russian Federation	New Zealand	
Singapore	Norway	
Slovak Republic	(Scotland)	
(Slovenia)	Sweden	
(Switzerland)	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in the DoDDS that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	6%
Top 50% (Half)	42%	50%	58%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: District of Columbia

If the public school students in the District of Columbia participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than DC	Not significantly different from DC	Lower than DC
(Australia)	(Colombia)	(South Africa)
(Austria)	(Kuwait)	
Belgium – Flemish		
(Belgium – French)		
(Bulgaria)		
Canada		
Cyprus		
Czech Republic		
(Denmark)		
(England)		
France		
(Germany)		
(Greece)		
Hong Kong		
Hungary		
Iceland		
Iran, Islamic Republic		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia-LSS)		
(Lithuania)		
(Netherlands)		
New Zealand		
Norway		
Portugal		
(Romania)		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in the District of Columbia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	1%	2%
Top 50% (Half)	9%	13%	17%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Florida

If the public school students in Florida participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Florida	Not significantly different from Florida	Lower than Florida
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium - Flemish	(England)	(Kuwait)
(Belgium - French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Latvia-LSS)	
France	(Lithuania)	
Hong Kong	New Zealand	
Hungary	Norway	
Ireland	(Romania)	
(Israel)	(Scotland)	
Japan	Spain	
Korea	United States (average)	
(Netherlands)		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Florida that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	2%	3%
Top 50% (Half)	31%	40%	49%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Georgia

If the public school students in Georgia participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Georgia	Not significantly different from Georgia	Lower than Georgia
(Australia)	Cyprus	(Colombia)
(Austria)	(Greece)	Iran, Islamic Republic
Belgium – Flemish	Iceland	(Kuwait)
(Belgium – French)	(Latvia-LSS)	(South Africa)
(Bulgaria)	(Lithuania)	
Canada	Portugal	
Czech Republic	(Romania)	
(Denmark)	(Scotland)	
(England)	Spain	
France	United States (average)	
(Germany)		
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Georgia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	2%	4%
Top 50% (Half)	30%	38%	46%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Guam

If the public school students in Guam participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Guam	Not significantly different from Guam	Lower than Guam
(Australia)	Iran, Islamic Republic	(Colombia)
(Austria)		(Kuwait)
Belgium – Flemish		(South Africa)
(Belgium – French)		
(Bulgaria)		
Canada		
Cyprus		
Czech Republic		
(Denmark)		
(England)		
France		
(Germany)		
(Greece)		
Hong Kong		
Hungary		
Iceland		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia-LSS)		
(Lithuania)		
(Netherlands)		
New Zealand		
Norway		
Portugal		
(Romania)		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Guam that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	1%	2%
Top 50% (Half)	13%	19%	25%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Hawaii

If the public school students in Hawaii participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Hawaii	Not significantly different from Hawaii	Lower than Hawaii
(Australia)	Cyprus	(Colombia)
(Austria)	(Greece)	Iran, Islamic Republic
Belgium – Flemish	Iceland	(Kuwait)
(Belgium – French)	(Latvia-LSS)	Portugal
(Bulgaria)	(Lithuania)	(South Africa)
Canada	(Romania)	
Czech Republic	(Scotland)	
(Denmark)	Spain	
(England)	United States (average)	
France		
(Germany)		
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Hawaii that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	4%
Top 50% (Half)	30%	37%	44%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Indiana

If the public school students in Indiana participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Indiana	Not significantly different from Indiana	Lower than Indiana
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
Czech Republic	(Bulgaria)	(Greece)
France	Canada	Iran, Islamic Republic
Hong Kong	(Denmark)	(Kuwait)
Hungary	(England)	(Lithuania)
Japan	(Germany)	Portugal
Korea	Iceland	(Romania)
Singapore	Ireland	(South Africa)
Slovak Republic	(Israel)	Spain
(Slovenia)	(Latvia – LSS)	
(Switzerland)	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Indiana that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	6%
Top 50% (Half)	42%	52%	62%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics
States (1996), Nations (1995)

State/Jurisdiction: (Iowa)

If the public school students in Iowa participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Iowa	Not significantly different from Iowa	Lower than Iowa
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(England)
Korea	Canada	(Greece)
Singapore	France	Iceland
	(Germany)	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Norway
	New Zealand	Portugal
	Russian Federation	(Romania)
	Slovak Republic	(Scotland)
	(Slovenia)	(South Africa)
	Sweden	Spain
	(Switzerland)	United States (average)
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Iowa that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	4%	7%
Top 50% (Half)	54%	63%	72%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Kentucky

If the public school students in Kentucky participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Kentucky	Not significantly different from Kentucky	Lower than Kentucky
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Latvia-LSS)	
France	(Lithuania)	
Hong Kong	New Zealand	
Hungary	Norway	
Ireland	(Romania)	
(Israel)	(Scotland)	
Japan	Spain	
Korea	United States (average)	
(Netherlands)		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Kentucky that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	2%	3%
Top 50% (Half)	31%	40%	48%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Louisiana

If the public school students in Louisiana participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Louisiana	Not significantly different from Louisiana	Lower than Louisiana
(Australia)	Cyprus	(Colombia)
(Austria)	Iran, Islamic Republic	(Kuwait)
Belgium – Flemish	(Lithuania)	(South Africa)
(Belgium – French)	Portugal	
(Bulgaria)		
Canada		
Czech Republic		
(Denmark)		
(England)		
France		
(Germany)		
(Greece)		
Hong Kong		
Hungary		
Iceland		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia-LSS)		
(Netherlands)		
New Zealand		
Norway		
(Romania)		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Louisiana that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	1%	1%
Top 50% (Half)	17%	25%	33%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Maine

If the public school students in Maine participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Maine	Not significantly different from Maine	Lower than Maine
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium - French)	(Denmark)
Japan	(Bulgaria)	(England)
Korea	Canada	(Greece)
Singapore	France	Iceland
	(Germany)	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia - LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Norway
	New Zealand	Portugal
	Russian Federation	(Romania)
	Slovak Republic	(Scotland)
	(Slovenia)	(South Africa)
	Sweden	Spain
	(Switzerland)	United States (average)
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Maine that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	6%	9%
Top 50% (Half)	54%	62%	71%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Maryland)

If the public school students in Maryland participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Maryland	Not significantly different from Maryland	Lower than Maryland
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia-LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	Sweden	
Singapore	(Thailand)	
Slovak Republic	United States (average)	
(Slovenia)		
(Switzerland)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Maryland that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	6%	9%
Top 50% (Half)	37%	45%	54%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Massachusetts

If the public school students in Massachusetts participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Massachusetts	Not significantly different from Massachusetts	Lower than Massachusetts
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Greece)
Japan	(Bulgaria)	Iceland
Korea	Canada	Iran, Islamic Republic
Singapore	(Denmark)	(Kuwait)
Slovak Republic	(England)	(Lithuania)
(Switzerland)	France	Portugal
	(Germany)	(Romania)
	Hungary	(South Africa)
	Ireland	Spain
	(Israel)	
	(Latvia – LSS)	
	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	(Slovenia)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Massachusetts that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level?
(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	8%
Top 50% (Half)	45%	55%	64%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Michigan)

If the public school students in Michigan participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Michigan	Not significantly different from Michigan	Lower than Michigan
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
Czech Republic	(Bulgaria)	(Greece)
Hong Kong	Canada	Iran, Islamic Republic
Japan	(Denmark)	(Kuwait)
Korea	(England)	(Lithuania)
Singapore	France	Portugal
Slovak Republic	(Germany)	(Romania)
(Slovenia)	Hungary	(South Africa)
(Switzerland)	Iceland	Spain
	Ireland	
	(Israel)	
	(Latvia – LSS)	
	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Michigan that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	5%	8%
Top 50% (Half)	44%	54%	63%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Minnesota

If the public school students in Minnesota participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Minnesota	Not significantly different from Minnesota	Lower than Minnesota
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(England)
Korea	Canada	(Greece)
Singapore	France	Iceland
	(Germany)	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Norway
	New Zealand	Portugal
	Russian Federation	(Romania)
	Slovak Republic	(Scotland)
	(Slovenia)	(South Africa)
	Sweden	Spain
	(Switzerland)	United States (average)
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Minnesota that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	3%	6%	10%
Top 50% (Half)	54%	62%	71%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparison of Actual TIMSS Scores from Public School Data for Minnesota with Actual TIMSS Scores for Nations: Grade 8 Mathematics (1995)

State/Jurisdiction: Minnesota*

How did the students in Minnesota perform in grade 8 mathematics in comparison to the students in the 41 nations that participated in TIMSS?

Nations whose performance was:

Higher than Minnesota	Not significantly different from Minnesota	Lower than Minnesota
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(Greece)
Korea	Canada	Iceland
Singapore	(England)	Iran, Islamic Republic
	France	(Kuwait)
	(Germany)	(Latvia – LSS)
	Hungary	(Lithuania)
	Ireland	Norway
	(Israel)	Portugal
	(Netherlands)	(Romania)
	New Zealand	(Scotland)
	Russian Federation	(South Africa)
	Slovak Republic	Spain
	(Slovenia)	United States (average)
	Sweden	
	(Switzerland)	
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What percentage of Minnesota's students performed above the TIMSS Top Ten Percent marker level? What percentage performed above the Top Half marker level? *(Below are estimates for the percentage of students who performed above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	3%	7%	11%
Top 50% (Half)	49%	57%	66%

* The comparisons and values shown in this profile represent actual TIMSS results and not estimated TIMSS results based on the link the between NAEP and TIMSS.

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Mississippi

If the public school students in Mississippi participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Mississippi	Not significantly different from Mississippi	Lower than Mississippi
(Australia)	Iran, Islamic Republic	(Colombia)
(Austria)	Portugal	(Kuwait)
Belgium – Flemish		(South Africa)
(Belgium – French)		
(Bulgaria)		
Canada		
Cyprus		
Czech Republic		
(Denmark)		
(England)		
France		
(Germany)		
(Greece)		
Hong Kong		
Hungary		
Iceland		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia-LSS)		
(Lithuania)		
(Netherlands)		
New Zealand		
Norway		
(Romania)		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Mississippi that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	1%	1%
Top 50% (Half)	17%	23%	30%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Missouri

If the public school students in Missouri participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Missouri	Not significantly different from Missouri	Lower than Missouri
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
(Bulgaria)	Canada	Iran, Islamic Republic
Czech Republic	(Denmark)	(Kuwait)
France	(England)	(Lithuania)
Hong Kong	(Germany)	Portugal
Hungary	(Greece)	(South Africa)
Japan	Iceland	
Korea	Ireland	
(Netherlands)	(Israel)	
Russian Federation	(Latvia – LSS)	
Singapore	New Zealand	
Slovak Republic	Norway	
(Slovenia)	(Romania)	
(Switzerland)	(Scotland)	
	Spain	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Missouri that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	39%	49%	58%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Montana)

If the public school students in Montana participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Montana	Not significantly different from Montana	Lower than Montana
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(England)
Korea	Canada	(Greece)
Singapore	France	Iceland
	(Germany)	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Norway
	New Zealand	Portugal
	Russian Federation	(Romania)
	Slovak Republic	(Scotland)
	(Slovenia)	(South Africa)
	Sweden	Spain
	(Switzerland)	United States (average)
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Montana that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	6%	9%
Top 50% (Half)	53%	62%	70%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Nebraska

If the public school students in Nebraska participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Nebraska	Not significantly different from Nebraska	Lower than Nebraska
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(England)
Korea	Canada	(Greece)
Singapore	France	Iceland
	(Germany)	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Norway
	New Zealand	Portugal
	Russian Federation	(Romania)
	Slovak Republic	(Scotland)
	(Slovenia)	(South Africa)
	Sweden	Spain
	(Switzerland)	United States (average)
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Nebraska that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	9%
Top 50% (Half)	52%	61%	69%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: New Mexico

If the public school students in New Mexico participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than New Mexico	Not significantly different from New Mexico	Lower than New Mexico
(Australia)	Cyprus	(Colombia)
(Austria)	(Greece)	Iran, Islamic Republic
Belgium – Flemish	Iceland	(Kuwait)
(Belgium – French)	(Latvia-LSS)	Portugal
(Bulgaria)	(Lithuania)	(South Africa)
Canada	(Romania)	
Czech Republic	(Scotland)	
(Denmark)	Spain	
(England)	United States (average)	
France		
(Germany)		
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in New Mexico that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	0%	2%	3%
Top 50% (Half)	28%	36%	45%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (New York)

If the public school students in New York participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than New York	Not significantly different from New York	Lower than New York
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia – LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	Sweden	
Singapore	(Thailand)	
Slovak Republic	United States (average)	
(Slovenia)		
(Switzerland)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines
Latvia LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in New York that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	6%
Top 50% (Half)	38%	47%	56%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: North Carolina

If the public school students in North Carolina participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than North Carolina	Not significantly different from North Carolina	Lower than North Carolina
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia-LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	United States (average)	
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in North Carolina that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	6%
Top 50% (Half)	34%	42%	51%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: North Dakota

If the public school students in North Dakota participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than North Dakota	Not significantly different from North Dakota	Lower than North Dakota
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(England)
Korea	Canada	(Greece)
Singapore	France	Iceland
	(Germany)	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	New Zealand
	Russian Federation	Norway
	Slovak Republic	Portugal
	(Slovenia)	(Romania)
	Sweden	(Scotland)
	(Switzerland)	(South Africa)
	(Thailand)	Spain
		United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in North Dakota that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	8%
Top 50% (Half)	56%	64%	71%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Oregon

If the public school students in Oregon participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Oregon	Not significantly different from Oregon	Lower than Oregon
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
Czech Republic	(Bulgaria)	(Greece)
France	Canada	Iran, Islamic Republic
Hong Kong	(Denmark)	(Kuwait)
Hungary	(England)	(Lithuania)
Japan	(Germany)	Portugal
Korea	Iceland	(Romania)
Singapore	Ireland	(South Africa)
Slovak Republic	(Israel)	Spain
(Slovenia)	(Latvia – LSS)	
(Switzerland)	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Oregon that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	4%	7%
Top 50% (Half)	44%	53%	61%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Rhode Island

If the public school students in Rhode Island participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Rhode Island	Not significantly different from Rhode Island	Lower than Rhode Island
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia-LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	United States (average)	
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Rhode Island that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	38%	46%	53%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (South Carolina)

If the public school students in South Carolina participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than South Carolina	Not significantly different from South Carolina	Lower than South Carolina
(Australia)	Cyprus	(Colombia)
(Austria)	(Greece)	Iran, Islamic Republic
Belgium – Flemish	Iceland	(Kuwait)
(Belgium – French)	(Latvia-LSS)	(South Africa)
(Bulgaria)	(Lithuania)	
Canada	Portugal	
Czech Republic	(Romania)	
(Denmark)	(Scotland)	
(England)	Spain	
France	United States (average)	
(Germany)		
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in South Carolina that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	2%	4%
Top 50% (Half)	26%	34%	42%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Tennessee

If the public school students in Tennessee participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Tennessee	Not significantly different from Tennessee	Lower than Tennessee
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(Greece)	(Kuwait)
(Belgium – French)	Iceland	Portugal
(Bulgaria)	(Latvia-LSS)	(South Africa)
Canada	(Lithuania)	
Czech Republic	(Romania)	
(England)	(Scotland)	
France	Spain	
(Germany)	United States (average)	
Hong Kong		
Hungary		
Ireland		
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Tennessee that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	0%	2%	3%
Top 50% (Half)	30%	38%	46%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Texas

If the public school students in Texas participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Texas	Not significantly different from Texas	Lower than Texas
(Australia)	(Denmark)	(Colombia)
(Austria)	(England)	Cyprus
Belgium – Flemish	(Germany)	Iran, Islamic Republic
(Belgium – French)	(Greece)	(Kuwait)
(Bulgaria)	Iceland	Portugal
Canada	(Israel)	(South Africa)
Czech Republic	(Latvia – LSS)	
France	(Lithuania)	
Hong Kong	New Zealand	
Hungary	Norway	
Ireland	(Romania)	
Japan	(Scotland)	
Korea	Spain	
(Netherlands)	Sweden	
Russian Federation	(Thailand)	
Singapore	United States (average)	
Slovak Republic		
(Slovenia)		
(Switzerland)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Texas that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	37%	46%	55%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Utah

If the public school students in Utah participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Utah	Not significantly different from Utah	Lower than Utah
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
Czech Republic	(Bulgaria)	(Greece)
France	Canada	Iceland
Hong Kong	(Denmark)	Iran, Islamic Republic
Hungary	(England)	(Kuwait)
Japan	(Germany)	(Lithuania)
Korea	Ireland	Portugal
Singapore	(Israel)	(Romania)
Slovak Republic	(Latvia – LSS)	(South Africa)
(Slovenia)	(Netherlands)	Spain
(Switzerland)	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Utah that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	45%	54%	63%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Vermont)

If the public school students in Vermont participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Vermont	Not significantly different from Vermont	Lower than Vermont
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Greece)
Japan	(Bulgaria)	Iceland
Korea	Canada	Iran, Islamic Republic
Singapore	(Denmark)	(Kuwait)
Slovak Republic	(England)	(Latvia – LSS)
(Switzerland)	France	(Lithuania)
	(Germany)	Portugal
	Hungary	(Romania)
	Ireland	(South Africa)
	(Israel)	Spain
	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	(Slovenia)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Vermont that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	4%	7%
Top 50% (Half)	49%	57%	66%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Virginia

If the public school students in Virginia participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Virginia	Not significantly different from Virginia	Lower than Virginia
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Israel)	
France	(Latvia-LSS)	
Hong Kong	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Russian Federation	Sweden	
Singapore	(Thailand)	
Slovak Republic	United States (average)	
(Slovenia)		
(Switzerland)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Virginia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	36%	45%	54%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Washington

If the public school students in Washington participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Washington	Not significantly different from Washington	Lower than Washington
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
Czech Republic	(Bulgaria)	(Greece)
France	Canada	Iran, Islamic Republic
Hong Kong	(Denmark)	(Kuwait)
Hungary	(England)	(Lithuania)
Japan	(Germany)	Portugal
Korea	Iceland	(Romania)
Singapore	Ireland	(South Africa)
Slovak Republic	(Israel)	Spain
(Slovenia)	(Latvia – LSS)	
(Switzerland)	(Netherlands)	
	New Zealand	
	Norway	
	Russian Federation	
	(Scotland)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Washington that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	4%	7%
Top 50% (Half)	45%	53%	61%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: West Virginia

If the public school students in West Virginia participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Virginia	Not significantly different from West Virginia	Lower than West Virginia
(Australia)	Cyprus	(Colombia)
(Austria)	(Denmark)	Iran, Islamic Republic
Belgium – Flemish	(England)	(Kuwait)
(Belgium – French)	(Germany)	Portugal
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	(Latvia-LSS)	
France	(Lithuania)	
Hong Kong	New Zealand	
Hungary	Norway	
Ireland	(Romania)	
(Israel)	(Scotland)	
Japan	Spain	
Korea	United States (average)	
(Netherlands)		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
(Switzerland)		
(Thailand)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in West Virginia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	0%	2%	3%
Top 50% (Half)	30%	38%	46%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: (Wisconsin)

If the public school students in Wisconsin participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Wisconsin	Not significantly different from Wisconsin	Lower than Wisconsin
Belgium – Flemish	(Australia)	(Colombia)
Czech Republic	(Austria)	Cyprus
Hong Kong	(Belgium – French)	(Denmark)
Japan	(Bulgaria)	(Greece)
Korea	Canada	Iceland
Singapore	(England)	Iran, Islamic Republic
	France	(Kuwait)
	(Germany)	(Latvia – LSS)
	Hungary	(Lithuania)
	Ireland	Norway
	(Israel)	Portugal
	(Netherlands)	(Romania)
	New Zealand	(Scotland)
	Russian Federation	(South Africa)
	Slovak Republic	Spain
	(Slovenia)	United States (average)
	Sweden	
	(Switzerland)	
	(Thailand)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Wisconsin that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	6%	9%
Top 50% (Half)	52%	61%	70%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Mathematics States (1996), Nations (1995)

State/Jurisdiction: Wyoming

If the public school students in Wyoming participated in TIMSS, how would their average performance in mathematics compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Wyoming	Not significantly different from Wyoming	Lower than Wyoming
(Austria)	(Australia)	(Colombia)
Belgium – Flemish	(Belgium – French)	Cyprus
(Bulgaria)	Canada	(Greece)
Czech Republic	(Denmark)	Iran, Islamic Republic
France	(England)	(Kuwait)
Hong Kong	(Germany)	(Lithuania)
Hungary	Iceland	Portugal
Japan	Ireland	(Romania)
Korea	(Israel)	(South Africa)
(Netherlands)	(Latvia – LSS)	Spain
Russian Federation	New Zealand	
Singapore	Norway	
Slovak Republic	(Scotland)	
(Slovenia)	Sweden	
(Switzerland)	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Wyoming that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	3%	5%
Top 50% (Half)	42%	52%	61%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

5. COMPARISONS OF EACH NAEP STATE AND JURISDICTION WITH THE TIMSS NATIONS FOR GRADE 8 SCIENCE

This chapter presents one-page profiles for each state and jurisdiction participating in grade 8 science in alphabetical order. Each profile contains two tables.

- The first table displays how the state or jurisdiction would perform in comparison to the 41 nations that took TIMSS science at grade 8. Each table indicates whether the **actual** scores of the participating TIMSS nations are significantly higher than, not significantly different from, or significantly lower than the **estimated** average performance of the public school students in the state or jurisdiction.

- The second table displays the range of possible values for the estimated percentage of public school students in the state or jurisdiction that would perform above the TIMSS Top Ten Percent marker level and the TIMSS Top Ten Half marker level for science at grade 8. The TIMSS Top Ten Percent marker level represents the score achieved by the top ten percent of all eighth grade students in the 41 TIMSS countries combined. The TIMSS Top Half marker level represents the score achieved by the top fifty percent of all eighth grade students in the 41 TIMSS countries combined. Each table presents the estimated percentage of public school students in the state that are expected to perform above the two TIMSS marker levels. The lower and upper bounds represent the range of possible values around the estimated percentages (95% confidence intervals).

A second profile is presented for the state of Minnesota. Similar tables to those described above are included. However, in this profile, the **actual** TIMSS results for Minnesota's public school students are compared with the results of the 41 nations who participated in TIMSS for grade 8 science.

Readers of these profiles are reminded that the state's or jurisdiction's TIMSS performance in grade 8 science is **estimated** from its NAEP score, using the linking function, and must therefore be interpreted with caution. Furthermore, the calculations for the 1996 NAEP scores and 1995 TIMSS scores for the participating states, jurisdictions and nations are based on samples of the student populations, not entire student populations. Hence, estimates are imprecise.

The SOLE purpose of these profiles is to allow the comparison of predicted TIMSS performances for individual states with the actual TIMSS performances of individual countries. It is NOT appropriate to use these profiles to compare performances between states or between countries. Accordingly, the profiles for the states and jurisdictions participating in NAEP grade 8 science are arranged in alphabetical order. The proper between state comparisons are provided in the NAEP reports (O'Sullivan, Reese and Mazzeo 1997; Reese et al. 1997), while the proper between country comparisons are provided in the TIMSS reports (Beaton, Mullis, et al. 1997; Beaton, Martin, et al. 1997).

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Alabama

If the public school students in Alabama participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Alabama	Not significantly different from Alabama	Lower than Alabama
(Australia)	(Denmark)	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Greece)	Cyprus
(Bulgaria)	Hong Kong	Iran, Islamic Republic
Canada	Iceland	(Kuwait)
Czech Republic	(Israel)	(South Africa)
(England)	(Latvia – LSS)	
(Germany)	(Lithuania)	
Hungary	New Zealand	
Ireland	Norway	
Japan	Portugal	
Korea	(Romania)	
(Netherlands)	(Scotland)	
Russian Federation	Spain	
Singapore	(Switzerland)	
Slovak Republic	(Thailand)	
(Slovenia)		
Sweden		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Alabama that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	6%	10%
Top 50% (Half)	37%	45%	53%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (Alaska)

If the public school students in Alaska participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Alaska	Not significantly different from Alaska	Lower than Alaska
Czech Republic	(Australia)	(Belgium – French)
Japan	(Austria)	(Colombia)
Singapore	Belgium – Flemish	Cyprus
	(Bulgaria)	(Denmark)
	Canada	France
	(England)	(Greece)
	(Germany)	Iceland
	Hong Kong	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	Korea	Portugal
	(Netherlands)	(Romania)
	New Zealand	(Scotland)
	Norway	(South Africa)
	Russian Federation	Spain
	Slovak Republic	
	(Slovenia)	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Alaska that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	8%	13%	18%
Top 50% (Half)	55%	62%	70%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Arizona

If the public school students in Arizona participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Arizona	Not significantly different from Arizona	Lower than Arizona
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
(England)	France	(Denmark)
Hungary	(Germany)	Iran, Islamic Republic
Japan	(Greece)	(Kuwait)
Korea	Hong Kong	(Latvia – LSS)
(Netherlands)	Iceland	(Lithuania)
Singapore	Ireland	Portugal
(Slovenia)	(Israel)	(Romania)
	New Zealand	(South Africa)
	Norway	
	Russian Federation	
	(Scotland)	
	Slovak Republic	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Arizona that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	8%	13%
Top 50% (Half)	43%	52%	60%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (Arkansas)

If the public school students in Arkansas participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Arkansas	Not significantly different from Arkansas	Lower than Arkansas
(Australia)	Canada	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Germany)	Cyprus
(Bulgaria)	(Greece)	(Denmark)
Czech Republic	Hong Kong	Iran, Islamic Republic
(England)	Iceland	(Kuwait)
Hungary	Ireland	(Latvia – LSS)
Japan	(Israel)	(Lithuania)
Korea	New Zealand	Portugal
(Netherlands)	Norway	(Romania)
Singapore	Russian Federation	(South Africa)
Slovak Republic	(Scotland)	
(Slovenia)	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Arkansas that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	8%	12%
Top 50% (Half)	44%	52%	60%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: California

If the public school students in California participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than California	Not significantly different from California	Lower than California
(Australia)	(Denmark)	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Greece)	Cyprus
(Bulgaria)	Hong Kong	Iran, Islamic Republic
Canada	Iceland	(Kuwait)
Czech Republic	(Israel)	(South Africa)
(England)	(Latvia – LSS)	
(Germany)	(Lithuania)	
Hungary	New Zealand	
Ireland	Portugal	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Norway	(Switzerland)	
Russian Federation	(Thailand)	
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in California that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	8%	11%
Top 50% (Half)	36%	44%	53%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Colorado

If the public school students in Colorado participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Colorado	Not significantly different from Colorado	Lower than Colorado
Singapore	(Australia)	(Belgium – French)
	(Austria)	(Colombia)
	Belgium – Flemish	Cyprus
	(Bulgaria)	(Denmark)
	Canada	France
	Czech Republic	(Greece)
	(England)	Hong Kong
	(Germany)	Iceland
	Hungary	Iran, Islamic Republic
	Ireland	(Kuwait)
	(Israel)	(Latvia – LSS)
	Japan	(Lithuania)
	Korea	Norway
	(Netherlands)	Portugal
	New Zealand	(Romania)
	Russian Federation	(Scotland)
	Slovak Republic	(South Africa)
	(Slovenia)	Spain
	Sweden	(Switzerland)
	United States (average)	(Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Colorado that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	8%	13%	18%
Top 50% (Half)	58%	65%	72%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Connecticut

If the public school students in Connecticut participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Connecticut	Not significantly different from Connecticut	Lower than Connecticut
Singapore	(Australia)	(Belgium – French)
	(Austria)	(Colombia)
	Belgium – Flemish	Cyprus
	(Bulgaria)	(Denmark)
	Canada	France
	Czech Republic	(Greece)
	(England)	Hong Kong
	(Germany)	Iceland
	Hungary	Iran, Islamic Republic
	Ireland	(Kuwait)
	(Israel)	(Latvia – LSS)
	Japan	(Lithuania)
	Korea	Norway
	(Netherlands)	Portugal
	New Zealand	(Romania)
	Russian Federation	(Scotland)
	Slovak Republic	(South Africa)
	(Slovenia)	Spain
	Sweden	(Switzerland)
	United States (average)	(Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Connecticut that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	10%	16%	22%
Top 50% (Half)	58%	65%	72%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Delaware

If the public school students in Delaware participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Delaware	Not significantly different from Delaware	Lower than Delaware
(Australia)	Canada	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Germany)	Cyprus
(Bulgaria)	(Greece)	(Denmark)
Czech Republic	Hong Kong	Iran, Islamic Republic
(England)	Iceland	(Kuwait)
Hungary	(Israel)	(Latvia – LSS)
Ireland	New Zealand	(Lithuania)
Japan	Norway	Portugal
Korea	(Romania)	(South Africa)
(Netherlands)	(Scotland)	
Russian Federation	Spain	
Singapore	(Switzerland)	
Slovak Republic	(Thailand)	
(Slovenia)	United States (average)	
Sweden		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Delaware that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	4%	7%	11%
Top 50% (Half)	42%	48%	55%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Department of Defense Domestic Dependent Elementary and Secondary Schools – DDESS

If the public school students in the DDESS participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than DDESS	Not significantly different from DDESS	Lower than DDESS
Czech Republic	(Australia)	(Belgium – French)
Japan	(Austria)	(Colombia)
Singapore	Belgium – Flemish	Cyprus
	(Bulgaria)	(Denmark)
	Canada	France
	(England)	(Greece)
	(Germany)	Iceland
	Hong Kong	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	Korea	Portugal
	(Netherlands)	(Romania)
	New Zealand	(Scotland)
	Norway	(South Africa)
	Russian Federation	Spain
	Slovak Republic	(Switzerland)
	(Slovenia)	
	Sweden	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in the DDESS that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	5%	10%	16%
Top 50% (Half)	53%	62%	72%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Department of Defense Dependents Schools Overseas – DoDDS

If the public school students in the DoDDS participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than DoDDS	Not significantly different from DoDDS	Lower than DoDDS
Singapore	(Australia) (Austria) Belgium – Flemish (Bulgaria) Czech Republic (England) (Germany) Hungary Ireland Japan Korea (Netherlands) Russian Federation Slovak Republic (Slovenia) Sweden United States (average)	(Belgium – French) Canada (Colombia) Cyprus (Denmark) France (Greece) Hong Kong Iceland Iran, Islamic Republic (Israel) (Kuwait) (Latvia – LSS) (Lithuania) New Zealand Norway Portugal (Romania) (Scotland) (South Africa) Spain (Switzerland) (Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in the DoDDS that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	7%	12%	17%
Top 50% (Half)	58%	65%	72%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: District of Columbia

If the public school students in the District of Columbia participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than DC	Not significantly different from DC	Lower than DC
(Australia)	(Colombia)	(South Africa)
(Austria)	(Kuwait)	
Belgium – Flemish		
(Belgium – French)		
(Bulgaria)		
Canada		
Cyprus		
Czech Republic		
(Denmark)		
(England)		
France		
(Germany)		
(Greece)		
Hong Kong		
Hungary		
Iceland		
Iran, Islamic Republic		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia – LSS)		
(Lithuania)		
(Netherlands)		
New Zealand		
Norway		
Portugal		
(Romania)		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in the District of Columbia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	1%	2%	3%
Top 50% (Half)	13%	17%	22%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Florida

If the public school students in Florida participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Florida	Not significantly different from Florida	Lower than Florida
(Australia)	Canada	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Germany)	Cyprus
(Bulgaria)	(Greece)	(Denmark)
Czech Republic	Hong Kong	Iran, Islamic Republic
(England)	Iceland	(Kuwait)
Hungary	Ireland	(Latvia – LSS)
Japan	(Israel)	(Lithuania)
Korea	New Zealand	Portugal
(Netherlands)	Norway	(South Africa)
Singapore	(Romania)	
Slovak Republic	Russian Federation	
(Slovenia)	(Scotland)	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Florida that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (*Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.*)

	Lower bound	Estimate	Upper bound
Top 10%	4%	8%	12%
Top 50% (Half)	40%	48%	57%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Georgia

If the public school students in Georgia participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Georgia	Not significantly different from Georgia	Lower than Georgia
(Australia)	Canada	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Germany)	Cyprus
(Bulgaria)	(Greece)	(Denmark)
Czech Republic	Hong Kong	Iran, Islamic Republic
(England)	Iceland	(Kuwait)
Hungary	Ireland	(Latvia – LSS)
Japan	(Israel)	(Lithuania)
Korea	New Zealand	Portugal
(Netherlands)	Norway	(South Africa)
Russian Federation	(Romania)	
Singapore	(Scotland)	
Slovak Republic	Spain	
(Slovenia)	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Georgia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	8%	13%
Top 50% (Half)	39%	47%	55%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Guam

If the public school students in Guam participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Guam	Not significantly different from Guam	Lower than Guam
(Australia)	Cyprus	(Colombia)
(Austria)	(Kuwait)	(South Africa)
Belgium – Flemish		
(Belgium – French)		
(Bulgaria)		
Canada		
Czech Republic		
(Denmark)		
(England)		
France		
(Germany)		
(Greece)		
Hong Kong		
Hungary		
Iceland		
Iran, Islamic Republic		
Ireland		
(Israel)		
Japan		
Korea		
(Latvia – LSS)		
(Lithuania)		
(Netherlands)		
New Zealand		
Norway		
Portugal		
(Romania)		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Guam that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	1%	2%	4%
Top 50% (Half)	19%	26%	32%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Hawaii

If the public school students in Hawaii participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Hawaii	Not significantly different from Hawaii	Lower than Hawaii
(Australia)	(Belgium – French)	(Colombia)
(Austria)	(Denmark)	Cyprus
Belgium – Flemish	France	(Kuwait)
(Bulgaria)	(Greece)	(South Africa)
Canada	Iceland	
Czech Republic	Iran, Islamic Republic	
(England)	(Latvia – LSS)	
(Germany)	(Lithuania)	
Hong Kong	Portugal	
Hungary	(Romania)	
Ireland	(Scotland)	
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Hawaii that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	7%
Top 50% (Half)	33%	40%	47%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Indiana

If the public school students in Indiana participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Indiana	Not significantly different from Indiana	Lower than Indiana
Czech Republic	(Australia)	(Belgium – French)
Japan	(Austria)	(Colombia)
Singapore	Belgium – Flemish	Cyprus
	(Bulgaria)	(Denmark)
	Canada	France
	(England)	(Greece)
	(Germany)	Iceland
	Hong Kong	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	Korea	Portugal
	(Netherlands)	(Romania)
	New Zealand	(Scotland)
	Norway	(South Africa)
	Russian Federation	Spain
	Slovak Republic	
	(Slovenia)	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Indiana that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	6%	12%	18%
Top 50% (Half)	53%	61%	70%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (Iowa)

If the public school students in Iowa participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Iowa	Not significantly different from Iowa	Lower than Iowa
Singapore	(Australia)	(Belgium – French)
	(Austria)	Canada
	(Bulgaria)	(Colombia)
	(Netherlands)	Cyprus
	(Slovenia)	(Denmark)
	Belgium – Flemish	France
	Czech Republic	(Germany)
	(England)	(Greece)
	Hungary	Hong Kong
	Ireland	Iceland
	Japan	Iran, Islamic Republic
	Korea	(Israel)
	Russian Federation	(Kuwait)
	Slovak Republic	(Latvia – LSS)
		(Lithuania)
		New Zealand
		Norway
		Portugal
		(Romania)
		(Scotland)
		(South Africa)
		Spain
		Sweden
		(Switzerland)
		(Thailand)
		United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Iowa that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	9%	15%	20%
Top 50% (Half)	61%	69%	76%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Kentucky

If the public school students in Kentucky participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Kentucky	Not significantly different from Kentucky	Lower than Kentucky
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
Japan	(England)	(Denmark)
Korea	(Germany)	France
(Netherlands)	Hong Kong	(Greece)
Singapore	Hungary	Iceland
(Slovenia)	Ireland	Iran, Islamic Republic
	(Israel)	(Kuwait)
	New Zealand	(Latvia – LSS)
	Norway	(Lithuania)
	Russian Federation	Portugal
	(Scotland)	(Romania)
	Slovak Republic	(South Africa)
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Kentucky that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	9%	13%
Top 50% (Half)	46%	54%	63%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Louisiana

If the public school students in Louisiana participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Louisiana	Not significantly different from Louisiana	Lower than Louisiana
(Australia)	(Belgium – French)	(Colombia)
(Austria)	Cyprus	(Kuwait)
Belgium – Flemish	(Denmark)	(South Africa)
(Bulgaria)	France	
Canada	(Greece)	
Czech Republic	Iceland	
(England)	Iran, Islamic Republic	
(Germany)	(Latvia – LSS)	
Hong Kong	(Lithuania)	
Hungary	Portugal	
Ireland	(Romania)	
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Louisiana that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	5%	8%
Top 50% (Half)	30%	38%	46%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Maine

If the public school students in Maine participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Maine	Not significantly different from Maine	Lower than Maine
Singapore	(Austria) (Bulgaria) Czech Republic (England) Japan Korea (Netherlands) (Slovenia)	(Australia) Belgium - Flemish (Belgium – French) Canada (Colombia) Cyprus (Denmark) France (Germany) (Greece) Hong Kong Hungary Iceland Iran, Islamic Republic Ireland (Israel) (Kuwait) (Latvia - LSS) (Lithuania) New Zealand Norway Portugal (Romania) Russian Federation (Scotland) Slovak Republic (South Africa) Spain Sweden (Switzerland) (Thailand) United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Maine that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	12%	18%	24%
Top 50% (Half)	68%	75%	82%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: (Maryland)

If the public school students in Maryland participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Maryland	Not significantly different from Maryland	Lower than Maryland
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
(England)	France	(Denmark)
Hungary	(Germany)	Iceland
Japan	(Greece)	Iran, Islamic Republic
Korea	Hong Kong	(Kuwait)
(Netherlands)	Ireland	(Latvia – LSS)
Singapore	(Israel)	(Lithuania)
(Slovenia)	New Zealand	Portugal
	Norway	(Romania)
	Russian Federation	(South Africa)
	(Scotland)	
	Slovak Republic	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Maryland that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	6%	11%	16%
Top 50% (Half)	45%	53%	60%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Massachusetts

If the public school students in Massachusetts participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Massachusetts	Not significantly different from Massachusetts	Lower than Massachusetts
Singapore	(Australia) (Austria) Belgium – Flemish (Bulgaria) Czech Republic (England) (Germany) Hungary Ireland Japan Korea (Netherlands) Russian Federation Slovak Republic (Slovenia) Sweden United States (average)	(Belgium – French) Canada (Colombia) Cyprus (Denmark) France (Greece) Hong Kong Iceland Iran, Islamic Republic (Israel) (Kuwait) (Latvia – LSS) (Lithuania) New Zealand Norway Portugal (Romania) (Scotland) (South Africa) Spain (Switzerland) (Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Massachusetts that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level?
(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	10%	16%	22%
Top 50% (Half)	59%	67%	74%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: (Michigan)

If the public school students in Michigan participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Michigan	Not significantly different from Michigan	Lower than Michigan
Czech Republic	(Australia)	(Belgium – French)
Singapore	(Austria)	(Colombia)
	Belgium – Flemish	Cyprus
	(Bulgaria)	(Denmark)
	Canada	France
	(England)	(Greece)
	(Germany)	Iceland
	Hong Kong	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	Japan	Portugal
	Korea	(Romania)
	(Netherlands)	(Scotland)
	New Zealand	(South Africa)
	Norway	Spain
	Russian Federation	
	Slovak Republic	
	(Slovenia)	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Michigan that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	8%	13%	19%
Top 50% (Half)	54%	62%	70%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Minnesota

If the public school students in Minnesota participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Minnesota	Not significantly different from Minnesota	Lower than Minnesota
Singapore	(Australia)	(Belgium – French)
	(Austria)	Canada
	Belgium – Flemish	(Colombia)
	(Bulgaria)	Cyprus
	Czech Republic	(Denmark)
	(England)	France
	Hungary	(Germany)
	Ireland	(Greece)
	Japan	Hong Kong
	Korea	Iceland
	(Netherlands)	Iran, Islamic Republic
	Russian Federation	(Israel)
	Slovak Republic	(Kuwait)
	(Slovenia)	(Latvia – LSS)
		(Lithuania)
		New Zealand
		Norway
		Portugal
		(Romania)
		(Scotland)
		(South Africa)
		Spain
		Sweden
		(Switzerland)
		(Thailand)
		United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Minnesota that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	9%	16%	23%
Top 50% (Half)	62%	69%	77%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Actual TIMSS Scores from Public School Data for Minnesota with Actual TIMSS Scores for Nations: Grade 8 Science (1995)

State/Jurisdiction: Minnesota*

How did the public school students in Minnesota perform in grade 8 science in comparison to the students in the 41 nations that participated in TIMSS?

Nations whose performance was:

Higher than Minnesota	Not significantly different from Minnesota	Lower than Minnesota
Singapore	(Australia) (Austria) Belgium – Flemish (Bulgaria) Czech Republic (England) Hungary Japan Korea (Netherlands) Slovak Republic (Slovenia)	(Belgium – French) Canada (Colombia) Cyprus (Denmark) France (Germany) (Greece) Hong Kong Iceland Iran, Islamic Republic Ireland (Israel) (Kuwait) (Latvia – LSS) (Lithuania) New Zealand Norway Portugal (Romania) Russian Federation (Scotland) (South Africa) Spain Sweden (Switzerland) (Thailand) United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What percentage of Minnesota's students performed above the TIMSS Top Ten Percent marker level? What percentage performed above the Top Half marker level? *(Below are estimates for the percentage of students who performed above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	15%	20%	25%
Top 50% (Half)	61%	67%	74%

* The comparisons and values shown in this profile represent actual TIMSS results and not estimated TIMSS results based on the link between NAEP and TIMSS.

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Mississippi

If the public school students in Mississippi participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Mississippi	Not significantly different from Mississippi	Lower than Mississippi
(Australia)	(Belgium – French)	(Colombia)
(Austria)	Cyprus	(Kuwait)
Belgium – Flemish	(Denmark)	(South Africa)
(Bulgaria)	France	
Canada	(Greece)	
Czech Republic	Iceland	
(England)	Iran, Islamic Republic	
(Germany)	(Latvia – LSS)	
Hong Kong	(Lithuania)	
Hungary	Portugal	
Ireland	(Romania)	
(Israel)		
Japan		
Korea		
(Netherlands)		
New Zealand		
Norway		
Russian Federation		
(Scotland)		
Singapore		
Slovak Republic		
(Slovenia)		
Spain		
Sweden		
(Switzerland)		
(Thailand)		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Mississippi that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	2%	4%	7%
Top 50% (Half)	29%	37%	45%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Missouri

If the public school students in Missouri participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Missouri	Not significantly different from Missouri	Lower than Missouri
Czech Republic	(Australia)	(Belgium – French)
Japan	(Austria)	(Colombia)
Korea	Belgium – Flemish	Cyprus
Singapore	(Bulgaria)	(Denmark)
	Canada	France
	(England)	(Greece)
	(Germany)	Iceland
	Hong Kong	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Portugal
	New Zealand	(Romania)
	Norway	(South Africa)
	Russian Federation	
	(Scotland)	
	Slovak Republic	
	(Slovenia)	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Missouri that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	6%	11%	16%
Top 50% (Half)	53%	61%	69%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (Montana)

If the public school students in Montana participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Montana	Not significantly different from Montana	Lower than Montana
Singapore	(Austria) Belgium - Flemish (Bulgaria) Czech Republic (England) Hungary Japan Korea (Netherlands) (Slovenia)	(Australia) (Belgium - French) Canada (Colombia) Cyprus (Denmark) France (Germany) (Greece) Hong Kong Iceland Iran, Islamic Republic Ireland (Israel) (Kuwait) (Latvia – LSS) (Lithuania) New Zealand Norway Portugal (Romania) Russian Federation (Scotland) Slovak Republic (South Africa) Spain Sweden (Switzerland) (Thailand) United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Montana that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	10%	16%	23%
Top 50% (Half)	68%	75%	82%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Nebraska

If the public school students in Nebraska participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Nebraska	Not significantly different from Nebraska	Lower than Nebraska
Singapore	(Australia) (Austria) Belgium – Flemish (Bulgaria) Czech Republic (England) Hungary Ireland Japan Korea (Netherlands) Russian Federation Slovak Republic (Slovenia) United States (average)	(Belgium – French) Canada (Colombia) Cyprus (Denmark) France (Germany) (Greece) Hong Kong Iceland Iran, Islamic Republic (Israel) (Kuwait) (Latvia – LSS) (Lithuania) New Zealand Norway Portugal (Romania) (Scotland) (South Africa) Spain Sweden (Switzerland) (Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Nebraska that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	9%	15%	21%
Top 50% (Half)	61%	68%	75%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: New Mexico

If the public school students in New Mexico participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than New Mexico	Not significantly different from New Mexico	Lower than New Mexico
(Australia)	Canada	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Germany)	Cyprus
(Bulgaria)	(Greece)	(Denmark)
Czech Republic	Hong Kong	Iran, Islamic Republic
(England)	Iceland	(Kuwait)
Hungary	(Israel)	(Latvia – LSS)
Ireland	New Zealand	(Lithuania)
Japan	Norway	Portugal
Korea	(Romania)	(South Africa)
(Netherlands)	(Scotland)	
Russian Federation	Spain	
Singapore	(Switzerland)	
Slovak Republic	(Thailand)	
(Slovenia)	United States (average)	
Sweden		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in New Mexico that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	7%	10%
Top 50% (Half)	40%	47%	54%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report*. (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: (New York)

If the public school students in New York participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than New York	Not significantly different from New York	Lower than New York
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
(England)	(Germany)	(Denmark)
Hungary	Hong Kong	France
Japan	Ireland	(Greece)
Korea	(Israel)	Iceland
(Netherlands)	New Zealand	Iran, Islamic Republic
Singapore	Norway	(Kuwait)
(Slovenia)	Russian Federation	(Latvia – LSS)
	(Scotland)	(Lithuania)
	Slovak Republic	Portugal
	Spain	(Romania)
	Sweden	(South Africa)
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in New York that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	7%	12%	17%
Top 50% (Half)	46%	54%	62%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: North Carolina

If the public school students in North Carolina participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than North Carolina	Not significantly different from North Carolina	Lower than North Carolina
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
(England)	(Germany)	(Denmark)
Hungary	Hong Kong	France
Japan	Ireland	(Greece)
Korea	(Israel)	Iceland
(Netherlands)	New Zealand	Iran, Islamic Republic
Singapore	Norway	(Kuwait)
(Slovenia)	Russian Federation	(Latvia – LSS)
	(Scotland)	(Lithuania)
	Slovak Republic	Portugal
	Spain	(Romania)
	Sweden	(South Africa)
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in North Carolina that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	6%	10%	14%
Top 50% (Half)	46%	54%	61%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: North Dakota

If the public school students in North Dakota participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than North Dakota	Not significantly different from North Dakota	Lower than North Dakota
Singapore	(Austria)	(Australia)
	(Bulgaria)	Belgium - Flemish
	Czech Republic	(Belgium - French)
	(England)	Canada
	Hungary	(Colombia)
	Japan	Cyprus
	Korea	(Denmark)
	(Netherlands)	France
	(Slovenia)	(Germany)
		(Greece)
		Hong Kong
		Iceland
		Iran, Islamic Republic
		Ireland
		(Israel)
		(Kuwait)
		(Latvia - LSS)
		(Lithuania)
		New Zealand
		Norway
		Portugal
		(Romania)
		Russian Federation
		(Scotland)
		Slovak Republic
		(South Africa)
		Spain
		Sweden
		(Switzerland)
		(Thailand)
		United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in North Dakota that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	10%	17%	24%
Top 50% (Half)	68%	75%	82%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Oregon

If the public school students in Oregon participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Oregon	Not significantly different from Oregon	Lower than Oregon
Singapore	(Australia) (Austria) Belgium – Flemish (Bulgaria) Canada Czech Republic (England) (Germany) Hungary Ireland (Israel) Japan Korea (Netherlands) New Zealand Norway Russian Federation Slovak Republic (Slovenia) Sweden (Thailand) United States (average)	(Belgium – French) (Colombia) Cyprus (Denmark) France (Greece) Hong Kong Iceland Iran, Islamic Republic (Kuwait) (Latvia – LSS) (Lithuania) Portugal (Romania) (Scotland) (South Africa) Spain (Switzerland)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Oregon that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	8%	13%	19%
Top 50% (Half)	57%	65%	73%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Rhode Island

If the public school students in Rhode Island participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Rhode Island	Not significantly different from Rhode Island	Lower than Rhode Island
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
Japan	(England)	(Denmark)
Korea	(Germany)	France
(Netherlands)	Hong Kong	(Greece)
Singapore	Hungary	Iceland
(Slovenia)	Ireland	Iran, Islamic Republic
	(Israel)	(Kuwait)
	New Zealand	(Latvia – LSS)
	Norway	(Lithuania)
	Russian Federation	Portugal
	(Scotland)	(Romania)
	Slovak Republic	(South Africa)
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Rhode Island that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	6%	10%	14%
Top 50% (Half)	49%	57%	64%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (South Carolina)

If the public school students in South Carolina participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than South Carolina	Not significantly different from South Carolina	Lower than South Carolina
(Australia)	(Denmark)	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Greece)	Cyprus
(Bulgaria)	Hong Kong	Iran, Islamic Republic
Canada	Iceland	(Kuwait)
Czech Republic	(Israel)	(South Africa)
(England)	(Latvia – LSS)	
(Germany)	(Lithuania)	
Hungary	New Zealand	
Ireland	Portugal	
Japan	(Romania)	
Korea	(Scotland)	
(Netherlands)	Spain	
Norway	(Switzerland)	
Russian Federation	(Thailand)	
Singapore		
Slovak Republic		
(Slovenia)		
Sweden		
United States (average)		

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in South Carolina that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	3%	7%	10%
Top 50% (Half)	34%	43%	51%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Tennessee

If the public school students in Tennessee participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Tennessee	Not significantly different from Tennessee	Lower than Tennessee
(Australia)	Canada	(Belgium – French)
(Austria)	France	(Colombia)
Belgium – Flemish	(Germany)	Cyprus
(Bulgaria)	(Greece)	(Denmark)
Czech Republic	Hong Kong	Iran, Islamic Republic
(England)	Iceland	(Kuwait)
Hungary	Ireland	(Latvia – LSS)
Japan	(Israel)	(Lithuania)
Korea	New Zealand	Portugal
(Netherlands)	Norway	(South Africa)
Singapore	(Romania)	
Slovak Republic	Russian Federation	
(Slovenia)	(Scotland)	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only.

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Tennessee that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	5%	9%	14%
Top 50% (Half)	42%	51%	60%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report*. (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Texas

If the public school students in Texas participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Texas	Not significantly different from Texas	Lower than Texas
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
(England)	France	(Denmark)
Hungary	(Germany)	Iran, Islamic Republic
Japan	(Greece)	(Kuwait)
Korea	Hong Kong	(Latvia – LSS)
(Netherlands)	Iceland	(Lithuania)
Singapore	Ireland	Portugal
(Slovenia)	(Israel)	(Romania)
	New Zealand	(South Africa)
	Norway	
	Russian Federation	
	(Scotland)	
	Slovak Republic	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Texas that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	5%	9%	13%
Top 50% (Half)	44%	53%	61%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Utah

If the public school students in Utah participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Utah	Not significantly different from Utah	Lower than Utah
Singapore	(Australia)	(Belgium – French)
	(Austria)	Canada
	Belgium – Flemish	(Colombia)
	(Bulgaria)	Cyprus
	Czech Republic	(Denmark)
	(England)	France
	(Germany)	(Greece)
	Hungary	Hong Kong
	Ireland	Iceland
	Japan	Iran, Islamic Republic
	Korea	(Israel)
	(Netherlands)	(Kuwait)
	Russian Federation	(Latvia – LSS)
	Slovak Republic	(Lithuania)
	(Slovenia)	New Zealand
	Sweden	Norway
	United States (average)	Portugal
		(Romania)
		(Scotland)
		(South Africa)
		Spain
		(Switzerland)
		(Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Utah that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	7%	12%	17%
Top 50% (Half)	60%	67%	74%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (Vermont)

If the public school students in Vermont participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Vermont	Not significantly different from Vermont	Lower than Vermont
Singapore	(Australia) (Austria) Belgium – Flemish (Bulgaria) Czech Republic (England) (Germany) Hungary Ireland Japan Korea (Netherlands) Russian Federation Slovak Republic (Slovenia) Sweden United States (average)	(Belgium – French) Canada (Colombia) Cyprus (Denmark) France (Greece) Hong Kong Iceland Iran, Islamic Republic (Israel) (Kuwait) (Latvia – LSS) (Lithuania) New Zealand Norway Portugal (Romania) (Scotland) (South Africa) Spain (Switzerland) (Thailand)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Vermont that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	8%	14%	20%
Top 50% (Half)	60%	67%	75%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: Virginia

If the public school students in Virginia participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Virginia	Not significantly different from Virginia	Lower than Virginia
Czech Republic	(Australia)	(Belgium – French)
Japan	(Austria)	(Colombia)
Korea	Belgium – Flemish	Cyprus
Singapore	(Bulgaria)	(Denmark)
	Canada	France
	(England)	(Greece)
	(Germany)	Iceland
	Hong Kong	Iran, Islamic Republic
	Hungary	(Kuwait)
	Ireland	(Latvia – LSS)
	(Israel)	(Lithuania)
	(Netherlands)	Portugal
	New Zealand	(Romania)
	Norway	(South Africa)
	Russian Federation	
	(Scotland)	
	Slovak Republic	
	(Slovenia)	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Virginia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	6%	11%	16%
Top 50% (Half)	48%	56%	65%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Washington

If the public school students in Washington participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Washington	Not significantly different from Washington	Lower than Washington
(Bulgaria)	(Australia)	(Belgium – French)
Czech Republic	(Austria)	(Colombia)
Japan	Belgium – Flemish	Cyprus
Korea	Canada	(Denmark)
Singapore	(England)	France
	(Germany)	(Greece)
	Hong Kong	Iceland
	Hungary	Iran, Islamic Republic
	Ireland	(Kuwait)
	(Israel)	(Latvia – LSS)
	(Netherlands)	(Lithuania)
	New Zealand	Portugal
	Norway	(Romania)
	Russian Federation	(South Africa)
	(Scotland)	
	Slovak Republic	
	(Slovenia)	
	Spain	
	Sweden	
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Washington that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	7%	11%	16%
Top 50% (Half)	50%	58%	66%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: West Virginia

If the public school students in West Virginia participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than West Virginia	Not significantly different from West Virginia	Lower than West Virginia
(Austria)	(Australia)	(Belgium – French)
(Bulgaria)	Belgium – Flemish	(Colombia)
Czech Republic	Canada	Cyprus
(England)	(Germany)	(Denmark)
Hungary	Hong Kong	France
Japan	Ireland	(Greece)
Korea	(Israel)	Iceland
(Netherlands)	New Zealand	Iran, Islamic Republic
Singapore	Norway	(Kuwait)
(Slovenia)	Russian Federation	(Latvia – LSS)
	(Scotland)	(Lithuania)
	Slovak Republic	Portugal
	Spain	(Romania)
	Sweden	(South Africa)
	(Switzerland)	
	(Thailand)	
	United States (average)	

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in West Virginia that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? (Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)

	Lower bound	Estimate	Upper bound
Top 10%	4%	7%	10%
Top 50% (Half)	46%	53%	61%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science States (1996), Nations (1995)

State/Jurisdiction: (Wisconsin)

If the public school students in Wisconsin participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Wisconsin	Not significantly different from Wisconsin	Lower than Wisconsin
Singapore	(Australia)	(Belgium - French)
	(Austria)	Canada
	Belgium – Flemish	(Colombia)
	(Bulgaria)	Cyprus
	Czech Republic	(Denmark)
	(England)	France
	Hungary	(Germany)
	Japan	(Greece)
	Korea	Hong Kong
	(Netherlands)	Iceland
	Slovak Republic	Iran, Islamic Republic
	(Slovenia)	Ireland
		(Israel)
		(Kuwait)
		(Latvia – LSS)
		(Lithuania)
		New Zealand
		Norway
		Portugal
		(Romania)
		Russian Federation
		(Scotland)
		(South Africa)
		Spain
		Sweden
		(Switzerland)
		(Thailand)
		United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Wisconsin that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	10%	17%	24%
Top 50% (Half)	63%	71%	79%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

Comparisons of Estimated TIMSS Scores from Public School NAEP Data for States and Jurisdictions with Actual TIMSS Scores for Nations: Grade 8 Science
States (1996), Nations (1995)

State/Jurisdiction: Wyoming

If the public school students in Wyoming participated in TIMSS, how would their average performance in science compare to that of students in the 41 nations that took TIMSS at grade 8?

Nations whose performance is expected to be:

Higher than Wyoming	Not significantly different from Wyoming	Lower than Wyoming
Singapore	(Australia)	(Belgium – French)
	(Austria)	Canada
	Belgium – Flemish	(Colombia)
	(Bulgaria)	Cyprus
	Czech Republic	(Denmark)
	(England)	France
	Hungary	(Germany)
	Ireland	(Greece)
	Japan	Hong Kong
	Korea	Iceland
	(Netherlands)	Iran, Islamic Republic
	Russian Federation	(Israel)
	Slovak Republic	(Kuwait)
	(Slovenia)	(Latvia – LSS)
		(Lithuania)
		New Zealand
		Norway
		Portugal
		(Romania)
		(Scotland)
		(South Africa)
		Spain
		Sweden
		(Switzerland)
		(Thailand)
		United States (average)

(Jurisdiction) indicates that the nation, state, or jurisdiction did not satisfy one or more of the sample participation guidelines.
Latvia-LSS: Latvian-speaking schools only

Comparisons of averages tell how typical students perform, but they do not describe how well the best students perform. What is the estimated percentage of students in Wyoming that would perform above the TIMSS Top Ten Percent marker level? What is the estimated percentage that would perform above the Top Half marker level? *(Below are estimates of the percentage of students expected to perform above the Top Ten Percent and Top Fifty Percent international marker levels. Each estimate is accompanied by a "Lower bound" and an "Upper bound" that reflect the range of possible values around the estimated percentage.)*

	Lower bound	Estimate	Upper bound
Top 10%	8%	13%	19%
Top 50% (Half)	62%	69%	75%

SOURCE: Johnson, E.G. (1998) *Linking the National Assessment of Educational Progress with the Third International Mathematics and Science Study for Eighth Grade: A Research Report.* (Publication No. NCES 98-499). Washington, DC: GPO.

REFERENCES

Beaton, A.E., Martin, M.O., Mullis, I.V.S., Gonzalez, E.J., Smith, T.A., and Kelly, D.L. (1996). *Science achievement in the Middle School Years: IEA's Third International Mathematics and Science Study (TIMSS)*. Chestnut Hill, MA: Boston College.

Beaton, A.E., Mullis, I.V.S., Martin, M.O., Gonzalez, E.J., Kelly, D.L., and Smith, T.A. (1996). *Mathematics achievement in the Middle School Years: IEA's Third International Mathematics and Science Study (TIMSS)*. Chestnut Hill, MA: Boston College.

Johnson, E.G. (1998). *Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study for Eighth Grade: A Research Report* (Publication No. NCES 98-499). Washington, DC: Government Printing Office.

National Education Goals Panel. (1991). *The National Education Goals Report: Building a nation of learners*. Washington, DC: author.

O' Sullivan, C.Y., Reese, C.M., & Mazzeo, J. (1997). *NAEP 1996 science report card for the nation and the states: Findings from the National Assessment of Educational Progress* (Publication No. NCES 97-499). Washington, DC: National Center for Education Statistics.

Pashley, P.J. and Phillips, G.W. (1993). *Toward world-class standards: A research study linking international and national assessments*. Princeton, NJ: Educational Testing Service.

Reese, C.M., Miller, K.E., Mazzeo, J., & Dossey, J.A. (1997). *NAEP 1996 mathematics report card for the nation and the states: Findings from the National Assessment of Educational Progress* (Publication No. NCES 97-488). Washington, DC: National Center for Education Statistics.

United States
Department of Education
Washington, DC 20208–5653

Official Business
Penalty for Private Use, $300

Postage and Fees Paid
U.S. Department of Education
Permit No. G–17

Standard Mail (A)